

What is claimed is:

1. A deck of playing card comprising at least a first set of playing cards and a second set of playing cards, where:

- (a) each set comprises  $2M + 1$  playing cards;
- (b) each playing card of each set comprises a playing face and a rear face;
- (c) each playing face of each playing card of the first set displays an integer within the range of  $-M$  to  $M$  which is different from all the other integers displayed on all the other playing faces of the playing cards of the first set;
- (d) each playing face of each playing card of the second set displays an integer within the range of  $-M$  to  $M$  which is different from all the other integers displayed on all the other playing faces of the playing cards of the second set; and
- (e)  $M$  is an integer at least equal to 10.

2. The deck of claim 1 where  $M$  equals 12.

3. The deck of claim 1 where  $M$  equals 13.

4. The deck of claim 1 further comprising a third set of playing cards and a fourth set of playing cards, where:

- (e) each playing face of each playing card of the third set displays an integer within the range of  $-M$  to  $M$  which is different from all the other integers displayed on all the other playing faces of the playing cards of the third set; and
- (d) each playing face of each playing card of the fourth set displays an integer within the range of  $-M$  to  $M$  which is different from all the other integers displayed on all the other playing faces of the playing cards of the fourth set.

5. A dice game apparatus comprising at least a first numerical die having  $N_1$  faces, where

- (a)  $N_1$  is an integer at least equal to 10; and
- (b) each face of the first numerical die bears a different first integer within the range of -1 to  $-N_1$ .

6. The dice game apparatus of claim 5 where  $N_1$  equals 10.

7. The dice game apparatus of claim 5 where  $N_1$  equals 12.

8. The dice game apparatus of claim 5 further comprising at least one additional numerical die selected from the group consisting of a second numerical die having  $N_2$  faces, a third numerical die having  $N_3$  faces, and a fourth numerical die having  $N_4$  faces, where

- (c)  $N_2$  is an integer at least equal to 10;
- (d) each face of the second numerical die bears a different second integer within the range of -1 to  $-N_2$ ;
- (e)  $N_3$  is an integer at least equal to 10;
- (f) each face of the third numerical die bears a different third integer within the range of 1 to  $N_3$ ;
- (g)  $N_4$  is an integer at least equal to 10; and
- (h) each face of the fourth numerical die bears a different fourth integer within the range of 1 to  $N_4$ .

9. The dice game apparatus of claim 8 further comprising at least one operator die selected from the group consisting of a first operator die having  $O_1$  faces and a second operator die having  $O_2$  faces, where

- (i)  $O_1$  is an integer at least equal to 10;

(j)  $X_1$  faces of the first operator die bear a fifth indicia representing the mathematical operation of addition, with  $X_1$  being an integer from 1 to  $2/3O_1$ ;

(k)  $Y_1$  faces of the first operator die bear a sixth indicia representing the mathematical operation of subtraction, with  $Y_1$  being an integer from 1 to  $2/3O_1$ ;

(l)  $Z_1$  faces of the first operator die bear a seventh indicia representing mathematical operations that a player can choose, with  $Z_1$  being an integer from 0 to  $2/3O_1$ ;

(m)  $X_1 + Y_1 + Z_1 = O_1$ ;

(n)  $O_2$  is an integer at least equal to 10;

(o)  $X_2$  faces of the second operator die bear an eighth indicia representing the mathematical operation of addition, with  $X_2$  being an integer from 1 to  $2/3O_2$ ;

(p)  $Y_2$  faces of the second operator die bear a ninth indicia representing the mathematical operation of subtraction, with  $Y_2$  being an integer from 1 to  $2/3O_2$ ;

(q)  $Z_2$  faces of the second operator die bear a tenth indicia representing mathematical operations that a player can choose, with  $Z_2$  being an integer from 0 to  $2/3O_2$ ;

(r)  $A_2$  faces of the second operator die bear an eleventh indicia representing the mathematical operation of multiplication, with  $A_2$  being an integer from 1 to  $2/3O_2$ ; and

(s)  $X_2 + Y_2 + Z_2 + A_2 = O_2$ .

10. The dice game apparatus of claim 5 further comprising a second numerical die having  $N_2$  faces, a third numerical die having  $N_3$  faces, a fourth numerical die having  $N_4$  faces, a first operator die having  $O_1$  faces, and a second operator die having  $O_2$  faces, where

(c)  $N_2$  is an integer at least equal to 10;

- (d) each face of the second numerical die bears a different second integer within the range of -1 to  $-N_2$ ;
- (e)  $N_3$  is an integer at least equal to 10;
- (f) each face of the third numerical die bears a different third integer within the range of 1 to  $N_3$ ;
- (g)  $N_4$  is an integer at least equal to 10;
- (h) each face of the fourth numerical die bears a different fourth integer within the range of 1 to  $N_2$ ;
- (i)  $O_1$  is an integer at least equal to 10;
- (j)  $X_1$  faces of the first operator die bear a fifth indicia representing the mathematical operation of addition, with  $X_1$  being an integer from 1 to  $2/3O_1$ ;
- (k)  $Y_1$  faces of the first operator die bear a sixth indicia representing the mathematical operation of subtraction, with  $Y_1$  being an integer from 1 to  $2/3O_1$ ;
- (l)  $Z_1$  faces of the first operator die bear a seventh indicia representing mathematical operations that a player can choose, with  $Z_1$  being an integer from 0 to  $2/3O_1$ ;
- (m)  $X_1 + Y_1 + Z_1 = O_1$ ;
- (n)  $O_2$  is an integer at least equal to 10;
- (o)  $X_2$  faces of the second operator die bear an eighth indicia representing the mathematical operation of addition, with  $X_2$  being an integer from 1 to  $2/3O_2$ ;
- (p)  $Y_2$  faces of the second operator die bear a ninth indicia representing the mathematical operation of subtraction, with  $Y_2$  being an integer from 1 to  $2/3O_2$ ;
- (q)  $Z_2$  faces of the second operator die bear a tenth indicia representing mathematical operations that a player can choose, with  $Z_2$  being an integer from 0 to  $2/3O_2$ ;

(r)  $A_2$  faces of the second operator die bear an eleventh indicia representing the mathematical operation of multiplication, with  $A_2$  being an integer from 1 to  $2/3O_2$ ; and

(s)  $X_2 + Y_2 + Z_2 + A_2 = O_2$ .

11. The dice game apparatus of claim 10 where  $N_1 = N_2 = N_3 = N_4 = O_1 = O_2 = 10$ .

12. The dice game apparatus of claim 10 where  $N_1 = N_2 = N_3 = N_4 = O_1 = O_2 = 12$ .

13. A method for playing dice comprising at least the steps of:

(a) rolling at least two numerical dice with one of the numerical die being a first numerical die having  $N_1$  faces and the other numerical die being selected from the group consisting of a second numerical die having  $N_2$  faces, a third numerical die having  $N_3$  faces, and a fourth numerical die having  $N_4$  faces;

(b) rolling an operator die selected from the group consisting of a first operator die having  $O_1$  faces and a second operator die having  $O_2$  faces; and

(c) solving the mathematical problem posed by the uppermost indicia on the two numerical dice and the operator die,  
where

(i)  $N_1$  is an integer at least equal to 10;

(ii) each face of the first numerical die bears a different first integer within the range of -1 to  $-N_1$ ;

(iii)  $N_2$  is an integer at least equal to 10;

(iv) each face of the second numerical die bears a different second integer within the range of -1 to  $-N_2$ ;

(v)  $N_3$  is an integer at least equal to 10;

- (vi) each face of the third numerical die bears a different third integer within the range of 1 to  $N_3$ ;
- (vii)  $N_4$  is an integer at least equal to 10;
- (viii) each face of the fourth numerical die bears a different fourth integer within the range of 1 to  $N_4$ ;
- (ix)  $O_1$  is an integer at least equal to 10;
- (x)  $X_1$  faces of the first operator die bear a fifth indicia representing the mathematical operation of addition, with  $X_1$  being an integer from 1 to  $2/3O_1$ ;
- (xi)  $Y_1$  faces of the first operator die bear a sixth indicia representing the mathematical operation of subtraction, with  $Y_1$  being an integer from 1 to  $2/3O_1$ ;
- (xii)  $Z_1$  faces of the first operator die bear a seventh indicia representing mathematical operations that a player can choose, with  $Z_1$  being an integer from 0 to  $2/3O_1$ ;
- (xiii)  $X_1 + Y_1 + Z_1 = O_1$ ;
- (xiv)  $O_2$  is an integer at least equal to 10;
- (xv)  $X_2$  faces of the second operator die bear an eighth indicia representing the mathematical operation of addition, with  $X_2$  being an integer from 1 to  $2/3O_2$ ;
- (xvi)  $Y_2$  faces of the second operator die bear a ninth indicia representing the mathematical operation of subtraction, with  $Y_2$  being an integer from 1 to  $2/3O_2$ ;
- (xvii)  $Z_2$  faces of the second operator die bear a tenth indicia representing mathematical operations that a player can choose, with  $Z_2$  being an integer from 0 to  $2/3O_2$ ;
- (xviii)  $A_2$  faces of the second operator die bear an eleventh indicia representing the mathematical operation of multiplication, with  $A_2$  being an integer from 1 to  $2/3O_2$ ; and
- (xix)  $X_2 + Y_2 + Z_2 + A_2 = O_2$ .

14. The method of claim 13 where steps (a) through (b) are performed substantially simultaneously.

15. The method of claim 13 where steps (a) through (c) are performed a plurality of times.

16. The method of claim 13 where steps (a) through (b) are performed substantially simultaneously and steps (a) through (c) are performed a plurality of times.

17. A deck of playing card comprising at least a first set of playing cards and a second set of playing cards, where:

(a) each set comprises  $M + 1$  playing cards;

(b) each playing card of each set comprises a playing face and a rear face;

(c) each playing face of each playing card of the first set displays an integer within the range of 0 to  $M$  which is different from all the other integers displayed on all the other playing faces of the playing cards of the first set;

(d) each playing face of each playing card of the second set displays an integer within the range of 0 to  $M$  which is different from all the other integers displayed on all the other playing faces of the playing cards of the second set; and

(e)  $M$  is an integer at least equal to 10.

18. The deck of claim 17 further comprising a third set of playing cards and a fourth set of playing cards, where:

(f) each playing face of each playing card of the third set displays an integer within the range of 0 to M which is different from all the other integers displayed on all the other playing faces of the playing cards of the third set; and

(g) each playing face of each playing card of the fourth set displays an integer within the range of 0 to M which is different from all the other integers displayed on all the other playing faces of the playing cards of the fourth set.

19. The deck of claim 18 where M equals 12.

20. The deck of claim 18 where each integer is displayed as a symbolic indicia of numerical value and as a pictorial indicia of numerical value.